

Application Number 10/565,537  
Amendment dated August 20, 2007  
Responsive to Office Action mailed May 18, 2007

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AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application.

**Listing of Claims:**

Claims 1-17 (Canceled).

Claim 18 (New) A method for cultivating eukaryotic microorganisms or blue algae, the method comprising:

applying the eukaryotic microorganisms or blue algae to a first major surface of a sheet-shaped perforated support, wherein the sheet-shaped perforated support is essentially impermeable to the eukaryotic microorganisms or blue algae and wherein the eukaryotic microorganisms or blue algae remain immobilized on the first major surface and are adapted to be removed;

supplying an aqueous solution to a second major surface of the sheet-shaped perforated support, wherein the aqueous solution flows along the second major surface of the sheet-shaped perforated support and wherein a portion of the aqueous solution flowing along the second major surface of the sheet-shaped perforated substrate is essentially transported by capillary forces from the second major surface to the first major surface through the sheet-shaped perforated support; and

growing the eukaryotic microorganisms or blue algae on the first major surface of the sheet-shaped perforated support.

Claim 19. (New) The method of claim 18, wherein a layer produced by the aqueous solution contains a distributing layer that distributes the aqueous solution across the second major surface.

Claim 20 (New) The method of claim 19, wherein the distributing layer comprises a non-woven material comprising glass or plastic fibers.

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Claim 21 (New) The method of claim 20, wherein the distributing layer comprises a geotextile.

Claim 22 (New) The method of claim 19, wherein the distributing layer is hydrophilic.

Claim 23 (New) The method of claim 19, wherein the sheet-shaped perforated support and the distributing layer are hydrophilic.

Claim 24 (New) The method of claim 18, wherein the sheet-shaped perforated support is hydrophilic.

Claim 25 (New) The method of claim 19, wherein the distributing layer comprises one or more of the following: mineral fibers and hydrophilic organic fibers.

Claim 26 (New) The method of claim 19, wherein the distributing layer and the sheet-shaped perforated support comprise one or more of the following: mineral fibers and hydrophilic organic fibers.

Claim 27 (New) The method of claim 18, wherein the sheet-shaped perforated support comprises one or more of the following: mineral fibers and hydrophilic organic fibers.

Claim 28 (New) The method of claim 18, wherein the sheet-shaped perforated support comprises a first sheet-shaped perforated support, the method further comprising:

supplying the aqueous solution between the second major surface of the first sheet-shaped perforated support and a second major surface of a second sheet-shaped perforated support, wherein the first and second sheet-shaped perforated supports have their second major surfaces facing each other and arranged essentially in parallel to each other.

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**Claim 29 (New)**      The method of claim 18, further comprising:  
removing the eukaryotic microorganisms or the blue algae from the sheet-shaped perforated support by application of mechanical forces.

**Claim 30 (New)**      The method of claim 18, further comprising:  
removing the eukaryotic microorganisms or the blue algae from the sheet-shaped perforated support by application of chemical treatment.